3-2-05

09,481,207

B4

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

APPLICANT:	Phillips, J.O.	ATTORNEY DOCKET:	01723326
PATENT NO.:	6,489,346	GROUP ART UNIT:	1625
FILED:	January 11, 2000	EXAMINER:	Fan, J.
TITLE:	Substituted Benzimidazole Dosage Forms and Method of Using Same		
DATE:	February 28, 2005	CUSTOMER NO.:	26565

Certificate of Mailing by "Express Mail"

"Express Mail" mailing label No. EV300809493US. Date of Deposit: February 28, 2005. I hereby certify that this paper (and its recited enclosures) or fee is being deposited with the United States Postal Service "Express Mail Post Office to Addressee" service under 37 CFR 1.10 on the date indicated above and is addressed to: Commissioner for Patents, MAIL STOP: Patent Extension., P.O. Box 1450, Alexandria, VA 22313-1450.

(signature of person mailing paper or fee) — Timothy Hubalik (typed name of person mailing paper or fee)

Commissioner for Patents
MAIL STOP: PATENT EXTENSION
P.O. Box 1450
Alexandria, VA 22313-1450

Dear Sir:

REQUEST FOR RECONSIDERATION

Applicant hereby requests reconsideration of the PTO's "Notice of Final Determination" dated August 30, 2004 in relation to the above-captioned patent. This Request is timely filed pursuant to 37 CFR 1.136, and Applicant has enclosed a check for $1590 to cover the fee for extension. If additional fees are required, authorization is hereby made to charge such fees to Deposit Account 13-0019.

The PTO bases its determination of ineligibility on two arguments: (1) "the approval of Zegerid™ was not the first permitted marketing or use of either the active ingredient thereof, omeprazole and sodium bicarbonate"[1]; and (2) Despite Applicant's showing of synergy, the

[1] PTO's Notice of Final Determination at p. 2.

Federal Circuit's decision in *Arnold Partnership v. Dudas*, 70 USPQ2d 1311 (Fed. Cir. 2004) precludes an extension based on synergy. Applicant's response to each argument is set forth below. In addition, in Section C below, Applicant provides another basis upon which its application should be granted.

Applicant incorporates herein by reference its Application for Patent Term Extension dated August 12, 2004 as if fully set forth herein (hereinafter "Application").

A. FDA's Approval of Zegerid™ was the First Permitted Marketing or Use of Immediate-Release Omeprazole Formulation

Applicant submits that the PTO is incorrect in assuming that there is no difference between Prilosec® (enteric-coated, delayed-release omeprazole) and Zegerid™ when applying 35 U.S.C. §156(f). As detailed in the Application, there are significant differences between these products. Prilosec® is enteric-coated and the omeprazole is not released from the dosage form until it reaches the duodenum where the higher pH causes the dissolution of the enteric coating resulting in the delayed-release characteristic of this product. In contrast, the omeprazole in Zegerid™ is immediately available upon oral ingestion with absorption of omeprazole starting in the stomach. This difference is supported by the pharmacokinetic evidence, which shows that the omeprazole serum concentrations rise much more rapidly for Zegerid™ in the first 45 minutes after dosing as compared to Prilosec®. The invention embodied in the Zegerid™ product is therefore a marked advance for patients in need of rapid absorption. Thus, comparing Zegerid™ to Prilosec® while disregarding the delayed release effect of Prilosec's® enteric-coating, is improper.

Indeed, Applicant submits that it is inappropriate for the PTO to rely on *Arnold Partnership v. Dudas* for the proposition that there is no difference between the hydrocodone/ibuprofen combination of that case and the omeprazole/sodium bicarbonate combination of the present case. Significantly, in the *Arnold* case, there was no issue, like here, regarding the use of non-enteric-coated drug, nor does it appear that the record before the court contained any evidence of synergy. Hydrocodone and ibuprofen were both previously and separately approved in tablet form and therefore in substantially the same form as the combination Vicoprofen®. That is simply not the case with Zegerid™, as detailed above.

The present case is highly similar to the facts of *Glaxo Operations UK Ltd. V. Quigg*, 894 F.2d 392 (Fed. Cir. 1990). In *Glaxo*, the Federal Circuit held that the patent holder was entitled

to an extension for cefuroxime axetil for oral use even though two salts of cefuroxime had been previously approved for intravenous and intramuscular use. *Id* at 393-96. It is undisputed that as among the dosage forms at issue in *Glaxo* (oral, IV and IM), the drug active in the blood is identical – cefuroxime. Thus, the holding hinged on the differences in dosage form and the use of an ester (axetil) to deliver the acid cefuroxime to the bloodstream. Until the ester was discovered, cefuroxime was not orally bioavailable. Intrinsic to the *Glaxo* holding is that the cefuroxime axetil for oral use was a previously unapproved "active ingredient" under §156(f). The Federal Circuit in *Glaxo* rejected the PTO's argument that §156 only applies to new chemical entities. *Id* at 397.

Likewise, Zegerid™ is a previously unapproved active ingredient for the purposes of §156(f) because of the substantial differences in pharmacokinetics and pharmacodynamics compared to Prilosec®. Stomach absorption of omeprazole via Zegerid™ is different from duodenal absorption via Prilosec®, just as absorption of IM cefuroxime sodium is different from gastrointestinal absorption of cefuroxime axetil. Zegerid™ contains a synergistic amount of sodium bicarbonate and further distinguishes it from the active ingredient in Prilosec®. Without the sodium bicarbonate, the acid-labile omeprazole is destroyed by the stomach acid. That is the reason why Prilosec® uses an enteric coating—to preserve bioavailability. Zegerid's™ use of sodium bicarbonate together with non-enteric-coated omeprazole is directly analogous to cefuroxime axetil, which was granted an extension. Therefore, the PTO's present position as to Zegerid™ is without merit and reconsideration is respectfully requested.

B. The PTO is Improperly Relying on Non-Binding Dicta to Support its Position that Synergy is Irrelevant

The Federal Circuit's statements in *Arnold Partnership v. Dudas* (which is not an en banc decision) about synergy were not necessary to the determination of the issues before it and, therefore, are dicta. As such, the PTO should not depart from its position in the MPEP that synergy can provide a basis for patent term extension. The court in *Arnold* did not consider any evidence of synergy and, thus, *Arnold* has no *stare decisis* effect whatsoever. The law is clear that dicta cannot be relied upon in subsequent rulings. *See Loveladies Harbor, Inc. v. U.S.*, 27 F.3d 1545, 1549 (Fed. Cir. 1994). *See also, Humphrey's Ex'r v. U.S.*, 55 S. Ct. 869, 873 (1935). Consequently, the PTO cannot rely upon *Arnold's* dicta about synergy.

C. **This is the First Permitted Commercial Marketing or Use of the Product *Under the Provision of Law Under Which Such Regulatory Review Period Occurred***

35 U.S.C. § 156(5)(A) provides that (emphasis added):

> except as provided in subparagraph (B) or (C), the permission for the commercial marketing or use of the product after such regulatory review period is the first permitted commercial marketing or use of the product ***under the provision of law under which such regulatory review period occurred***;

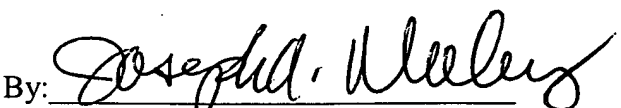
The NDA leading to approval of Zegerid™ was submitted pursuant to section 505**(b)(2)** of the Federal Food, Drug and Cosmetic Act. Upon information and belief, none of the NDAs or ANDAs previously approved for omeprazole were filed and thus reviewed under section 505(b)(2). For example, it appears that the full NDAs previously filed were filed (and thus reviewed) under section 505(b)(1) while the approved ANDAs are believed to have been filed and reviewed under section 505(j). Each of these are distinct and separate ***provisions of law under which regulatory review occurred***. Therefore, Santarus' NDA 21-636 resulted in the first permitted commercial marketing or use of the product ***under the provision of law under which such regulatory review period occurred***, namely, 505(b)(2). For the PTO's convenience, Applicant has attached a listing of omeprazole approvals as shown on FDA's website. For at least this reason, then, Applicant's application for extension should be granted.

D. **Conclusion**

For the foregoing reasons, Applicant's Application for Patent Term Extension should be granted. Applicant requests favorable notification to that effect. Should the PTO have any questions concerning this matter, the PTO is encouraged to contact the undersigned.

Respectfully submitted,

MAYER, BROWN, ROWE & MAW LLP

By: 
Joseph A. Mahoney, Reg. No. 38,956

CUSTOMER NUMBER 26565
MAYER, BROWN, ROWE & MAW LLP
P.O. Box 2828
Chicago, IL 60690-2828
Telephone: (312) 701-8979

Facsimile: (312) 706-9000

Enclosures: Listing of omeprazole approvals from the FDA website.

U.S. Food and Drug Administration

CENTER FOR DRUG EVALUATION AND RESEARCH

Drugs@FDA

Overview

Drug Name	**OMEPRAZOLE**
Active Ingredient(s)	• **OMEPRAZOLE**
Form(s) and Strength(s) Available	• **CAPSULE, DELAYED REL PELLETS; ORAL:10MG ;20MG ;40MG** • **Capsule, Delayed-Release:40MG** • **Capsule; Oral:10MG ;20MG**

Details about drugs are organized by FDA Application Number (NDA or ANDA or BLA).

Click on a drug name or application number to view drug details:

Drug Name and FDA Application Number	Dosage Form/Route	Strength	Marketing Status	Compa
OMEPRAZOLE (ANDA # 075347)	CAPSULE, DELAYED REL PELLETS; ORAL	Multiple Strengths	Prescription	ANDRX PHARMS
OMEPRAZOLE (ANDA # 075347)	CAPSULE, DELAYED REL PELLETS; ORAL	40MG	None (Tentative Approval)	ANDRX PHARMS
OMEPRAZOLE (ANDA # 075791)	CAPSULE, DELAYED REL PELLETS; ORAL	Multiple Strengths	Prescription	EON
OMEPRAZOLE (ANDA # 075268)	Capsule; Oral	Multiple Strengths	None (Tentative Approval)	GENPHA
OMEPRAZOLE (ANDA # 075785)	CAPSULE, DELAYED REL PELLETS; ORAL	Multiple Strengths	Prescription	IMPAX LABS
OMEPRAZOLE (ANDA # 075785)	Capsule, Delayed Rel Pellets; Oral	40MG	None (Tentative Approval)	IMPAX LABS
OMEPRAZOLE (ANDA # 075410)	CAPSULE, DELAYED REL PELLETS; ORAL	Multiple Strengths	Prescription	KREMEF URBAN DEV
OMEPRAZOLE (ANDA # 075757)	CAPSULE, DELAYED REL PELLETS; ORAL	Multiple Strengths	Prescription	LEK PHARMS
OMEPRAZOLE (ANDA # 075876)	CAPSULE, DELAYED REL PELLETS; ORAL	Multiple Strengths	Prescription	MYLAN
OMEPRAZOLE (ANDA # 075876)	Capsule, Delayed Rel Pellets; Oral	40MG	None (Tentative Approval)	MYLAN
OMEPRAZOLE (ANDA # 076048)	CAPSULE, DELAYED REL PELLETS; ORAL	Multiple Strengths	Prescription	TORPHA
OMEPRAZOLE	Capsule, Delayed-	40MG	None (Tentative	TORPHA

(ANDA # 076048)	Release		Approval)

Back to Top | Back to Previous Page | Start Over

Disclaimer

CDER Home Page | CDER Site Info | Contact CDER | What's New @ CDER
FDA Home Page | Search FDA Site | FDA A-Z Index | Contact FDA | Privacy | Accessibility | HHS Home Page

FDA/Center for Drug Evaluation and Research
Office of Training and Communications
Division of Library and Information Services
Update Frequency: Daily

U.S. Food and Drug Administration

CENTER FOR DRUG EVALUATION AND RESEARCH

Drugs@FDA

Overview

Drug Name	**PRILOSEC**
Active Ingredient(s)	**• OMEPRAZOLE**
Form(s) and Strength(s) Available	**• CAPSULE, DELAYED REL PELLETS; ORAL:10MG ;20MG ;40MG**

Details about drugs are organized by FDA Application Number (NDA or ANDA or BLA).

Click on a drug name or application number to view drug details:

Drug Name and FDA Application Number	Dosage Form/Route	Strength	Marketing Status	Compan
PRILOSEC (NDA # 019810)	CAPSULE, DELAYED REL PELLETS; ORAL	Multiple Strengths	Prescription	ASTRAZENI

Back to Top | Back to Previous Page | Start Over

FDA/Center for Drug Evaluation and Research
Office of Training and Communications
Division of Library and Information Services
Update Frequency: Daily

U.S. Food and Drug Administration

CENTER FOR DRUG EVALUATION AND RESEARCH

Drugs@FDA

Overview

Drug Name	**PRILOSEC OTC**
Active Ingredient(s)	**• OMEPRAZOLE MAGNESIUM**
Form(s) and Strength(s) Available	**• TABLET, DELAYED RELEASE; ORAL:EQ 20MG BASE**

Details about drugs are organized by FDA Application Number (NDA or ANDA or BLA).

Click on a drug name or application number to view drug details:

Drug Name and FDA Application Number	Dosage Form/Route	Strength	Marketing Status	Compan
PRILOSEC OTC (NDA # 021229)	TABLET, DELAYED RELEASE; ORAL	EQ 20MG BASE	Over-the-counter	ASTRAZENI

Back to Top | Back to Previous Page | Start Over

Disclaimer

CDER Home Page | CDER Site Info | Contact CDER | What's New @ CDER
FDA Home Page | Search FDA Site | FDA A-Z Index | Contact FDA | Privacy | Accessibility | HHS Home Page

FDA/Center for Drug Evaluation and Research
Office of Training and Communications
Division of Library and Information Services
Update Frequency: Daily